

From The Editors Desk:

I have been thinking a lot about litter recently as we get ready for the Take Pride In Page County clean up. This is the 4th year for the event and each year the community gets more involved. More businesses have donated prizes for the litter competition this year than ever before. Teams have until April 8 this year to sign up for the competition but we are hoping there will be a lot of folks vying for the \$200 in gift certificates donated by Holtzman Oil/Propane and the other generous prizes from our local businesses.

We are also encouraging folks who pick up litter during the week to save their aluminum cans and give them to the Skatepark Committee. This is a win-win-win-win situation. Ugly litter is cleaned up, recycling of the aluminum saves landfill space, proceeds go to the Skatepark which supports the kids in the community and the pull tabs will be saved for a program which helps dialysis patients receive the care they need.

A fifth win could be added if you consider the exercise component of picking up litter. You bet - it can be just as aerobic as you want it to be. There is something kind of wholesome about it. You are outside, the sun is shining (though if you want to pick up litter in the rain that's OK, too), and you definitely work on flexibility while bending over to pick up the trash.

I average two plastic grocery bags of aluminum cans in about an hour and a half walk/cleanup when I go out – and I crush the cans. Yes, there is a lot of aluminum beverage cans thrown out on the sides of the road. And it ain't just soda. Do be cautious of your fellow drivers; judging from the number of beer cans I find, the drinking and driving problem is not over by any means.

Yes, it's a shame that we have to spend our time cleaning up after other people. But that is the way it is. Page County is not the only place struggling with uncaring slobs who can't take care of their own garbage. It is an international problem. If you see someone littering from their vehicle, get a license tag number and turn it in to the police. If you find litter on the side of the road with a name and address in or on it, give me a call. Littering is illegal in the state of Virginia. Fines are up to \$2,500 and up to 12 months in jail.

Trash that flies off the back of an uncovered pickup truck is considered litter as well. Virginia State Code says that no vehicle shall be operated or moved on any highway unless it is so constructed, maintained, and loaded as to prevent its contents from dropping, sifting, leaking, or otherwise escaping. The same litter fines apply and I dare say most judges aren't going to buy the "but I didn't know it flew off" line.

It has been proven, though, that people tend to litter more in places where there is already litter. This is where the pride part of Take Pride In Page County comes in. By cleaning up the litter we are saying yes, we care. Yes, we are proud of what we have and no, we do not accept the roadsides the way they are. We are not proud of litter fouling the beauty of the valley and we are not proud of the people who think it is okay to trash our county.

So please take part in Take Pride In Page County Week. Create a team of your neighbors and collect the garbage near your home. Get your church involved. Get your kids to help. Talk the folks you work with into going out one afternoon (or three) and picking up during April 11-18. Better yet, adopt a highway through VDOT and commit to keeping a stretch of road clean all year. Or enroll in the Adopt-A-Spot program.

If you pick up just one piece of trash during the week it will help. And you can be proud of caring and get a workout at the same time!

Chris Anderson, Editor



The Asian Gypsy Moth - - New Threat to Eastern Forests

By Joe Lehen, Virginia Department of Forestry

The Asian gypsy moth is of the exact same genus & species (*Lymantria dispar*) as the European gypsy moth which is the type of gypsy moth that we have here in Virginia. The only reason it is called "Asian" is because that is where it originated.

The Asian gypsy moth is somewhat larger than its European cousin. Also, female Asian gypsy moths can fly (up to 20 miles), but the European females are flightless. Due to its ability to fly several miles, the Asian gypsy moth can distribute itself across the countryside at a much faster rate than the gypsy moth that we are all familiar with. Our European gypsy moth population took almost 120 years to move from Massachusetts down into Virginia.

The Asian gypsy moth caterpillars eat a wider variety of foods, including pine trees. However, like the present gypsy moths found in Virginia, oak trees are still the preferred food for the Asian gypsy moth caterpillar.

It was 1991 when the Asian gypsy moth was first detected on the west coast of North America in British Columbia, Washington and Oregon. It was theorized that these moths hitchhiked to our continent on a ship from Russia. This infestation was supposedly eradicated by spraying and there were no more west coast reports of Asian gypsy moths until 1997 when it was found once more in Washington, and in 2000 when it was found living comfortably in Portland, Oregon. These populations were also eradicated through aggressive spraying programs.

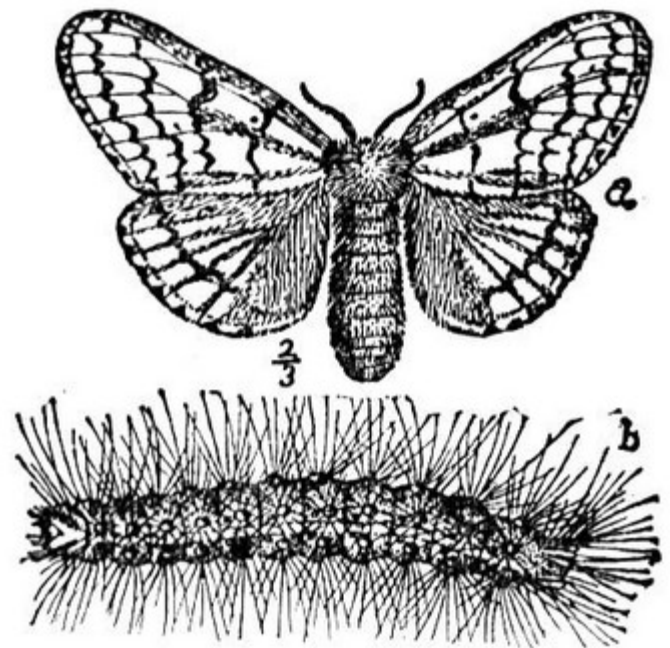
There was once an east coast Asian gypsy moth population in the Wilmington, North Carolina area. This population also arrived on our shores thanks to the shipping industry. Again, both North & South Carolina aggressively sprayed the forest to eliminate this destructive insect.

So what about the future? I am confident of two things: first, there are probably still some Asian gypsy moths in North America, probably out on the west coast; and secondly, this problem of recurring infestations of this destructive forest insect are not going to stop. As the world continues to get "smaller" and trade among nations continues to increase, critters like the

Asian gypsy moths are going to get free rides of thousands of miles to our shorelines. We just need to be prepared to deal with them.

Questions remain as to what will happen if the Asian gypsy moths become established here and begin breeding with the European gypsy moths already living here. Research has shown that these two strains of gypsy moths can breed and hybridize. Does this mean that the hybridized European females will begin to fly? Or will the Asian females lose their ability to fly due to this mixed breeding? Will the fungus and virus that are controlling our current gypsy moth population also control the Asian gypsy moth? More good research on the Asian gypsy moth, in conjunction with aggressive eradication programs will be the keys to the long term control of this destructive insect.

Note: This article is adapted from a presentation by Joe Lehen, made at the 2005 Association of Virginia Gypsy Moth Managers conference, held February 23-25, 2005 at the Mimslyn Inn.





LITTER GRABBERS FOR SALE

Order yours now for Take Pride In Page County Week, for your Adopt-A-Highway cleanups or for your own neighborhood litter cleanup event.

**Only \$10.00 each
Call the Department of Environmental Services at 743-4808 to place your order**

Page County/Virginia Water Trivia

- Yager Spring flows at an average of 3,456 gallons per minute (gpm). The highest average flow is 4,422 gpm and the lowest average flow is 2,374 gpm. Data has been gathered since 1962.
- The South Fork of the Shenandoah River flows for 53.11 miles through Page County.
- There are currently 219.8 acres enrolled in the Conservation Reserve Enhancement Program (CREP) in Page County.
- There are 3 Class I Brook Trout streams in Page County. Virginia has 2300 total miles of trout stream – more than any other south eastern state.
- There are 464 watersheds in Virginia.
- The Clean Water Act was passed in 1972.
- The Virginia Scenic Waters Act was passed in 1970. There are 19 rivers nominated as Scenic Waters so far with 10 more under consideration.
- The annual rate of precipitation in Page County is 34 inches.
- There are only 27 Virginia counties which have karst topography.
- There have been 58 species of fish documented in the Shenandoah River.

- There are approximately 1,000 acres under conservation easements in Page County

Watershed Dialogue (continued from front page)

... a strong interest in protecting its local water.

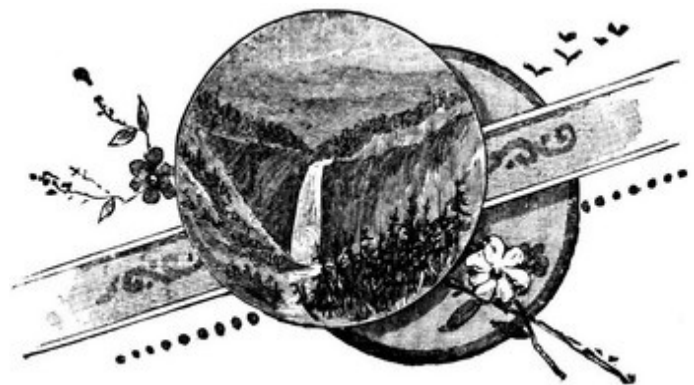
Several main issues which were discussed at the event included the concept that proactive local solutions are better than reacting to regulation, a lot of activity has already taken place in Page County to benefit local water quality, continued involvement of all stakeholders is crucial for effective watershed management and the close interaction between surface and ground water.

Several participants expressed a sense of urgency for creating a watershed management plan in the face of coming development. However, it was also stated that a balance must be maintained between the measures proposed to protect water quality and the feasibility of actually implementing such proposals.

Organizers said that maintaining open space by supporting the local farming community will benefit the county in both the short and long term.

Assistance was offered to Page County to help create a watershed plan by the Canaan Valley Institute and the Valley Conservation Council in addition to the sponsoring groups.

If you are interested in participating in the creation of the Page County Watershed Management Plan, please call 743-4808.



SHENANDOAH VALLEY AIR – SUBJECT OF NEW STUDY by Steve Bauserman, Winchester City Council and Jim Giraytys, Certified Consulting Meteorologist

SHENAIR, the acronym for Shenandoah Valley Air Quality Initiative, is a regional, grass-roots initiative for managing the quality of the air in the Valley. There already is a recognized and growing problem with air quality. The readings from ozone gauges at Roanoke, in the Shenandoah National Park, at Winchester/Frederick County and on up into West Virginia and Maryland do not conform to the Environmental Protection Agency (EPA) standards. A one-year study by Virginia Department of Environmental Quality (DEQ) and EPA has started in the Winchester area to look at the impact of emissions from all sources on the area cancer rates. Winchester and Frederick County have entered into an Early Action agreement with DEQ and EPA to reduce the ozone concentrations during the summer months by the end of 2007. New EPA regulations will seek to control certain emissions from power plants located to the west of the Valley as far as the Mississippi river. EPA is ready to set new standards on the emissions of mercury from power plants. People living in the Valley know that the visibility along the Skyline Drive has been greatly reduced during the summer due to pollutants in the atmosphere. A good web site to obtain information on air quality is maintained by EPA at <http://www.epa.gov/airnow/>.

The intent of those of us working on SHENAIR is to deal with these and similar issues on a regional basis. At the moment, we have estimates of what pollution is locally generated and what is transported in on the wind from other areas. But, we don't have hard information. We also know that vehicles of all sorts are the leading source of emissions that create ozone, and they put small particles in the atmosphere that can cause cancer and other diseases of the lungs. But, we don't have good information that would allow local governments and businesses to improve the situation. We know that the deposition of polluting materials, such as mercury, in the watershed cause serious

problems. In fact, the National Oceanic and Atmospheric Administration (NOAA) studies suggest that various chemical compounds of nitrogen oxide deposited from the air on the Chesapeake Bay watershed contribute up to 75% of those compounds found in the Bay.

In January 2005, the Northern Shenandoah Valley Regional Commission gave SHENAIR a charter to develop a regional program to do something about these kinds of issues. A month earlier, Congress passed legislation introduced by Congressman Frank Wolf that provided money to start an air quality program in the Valley. James Madison University at Harrisonburg has formed a SHENAIR Institute that will conduct the science program for SHENAIR. In fact, a major goal of SHENAIR is to put science to work to manage the air quality issues in the Valley. We need hard information if the health and economic issues posed by poor air quality are to be addressed. In addition to JMU, SHENAIR is bringing in Virginia Tech and Lord Fairfax Community College, and will reach out to other educational institutions in the Valley to ensure that a broad base of scientific talent works on the problems and solutions.

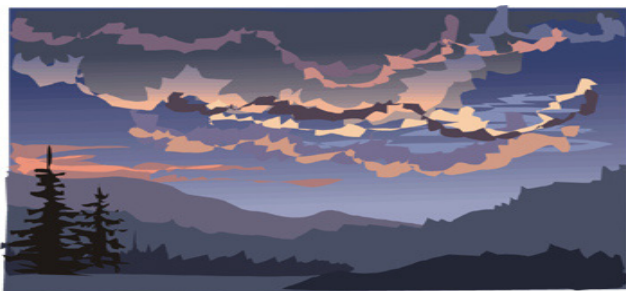
A regional SHENAIR steering committee of government officials and representatives has been assembled with initial participation from Clarke, Warren, Shenandoah, Frederick, and Page Counties, and Winchester City. We expect that other jurisdictions in the Valley will elect to join the committee in the near future.

Although Congress has included funding in the fiscal year 2005 NOAA budget for an air quality program in the Valley, a science plan and program has to be submitted to NOAA to obtain that funding. That program will include additional monitoring stations throughout the Valley both for air quality and meteorology, a program for analyzing the data and developing scientific recommendations, and developing tools for local governments and businesses to put the recommendations to work. There will also be a program to assess the health and other costs to society due to poor air quality. All of that will be accompanied with a program to educate and inform the general public about air quality issues. Winchester/Frederick County has hired JMU to assist in their efforts to come into

compliance with the EPA standards for ozone, as well as to design and conduct the education and outreach program beginning with the ozone season that starts in May 2005. The work will be done in cooperation with the SHENAIR Institute.

Thanks to the active support of local governments and citizen's groups and the efforts of Congressman Wolf and JMU, the SHENAIR program is off to an excellent start.

More info is available at www.isat.jmu.edu/shenair/index.



WAL-MART RECYCLES ALUMINUM CANS TO HELP THE DEPARTMENT OF ENVIRONMENTAL SERVICES AND THE SKATEPARK COMMITTEE

Following the "Connect the Community" aluminum can drive, an employee called me to say Wal-Mart would like to help support recycling and the skatepark fund drive.

This was great! One of the goals of the Department is to tap into areas of the county where there is an interest in recycling and help those businesses and individuals to 'realize their recycling dreams'.

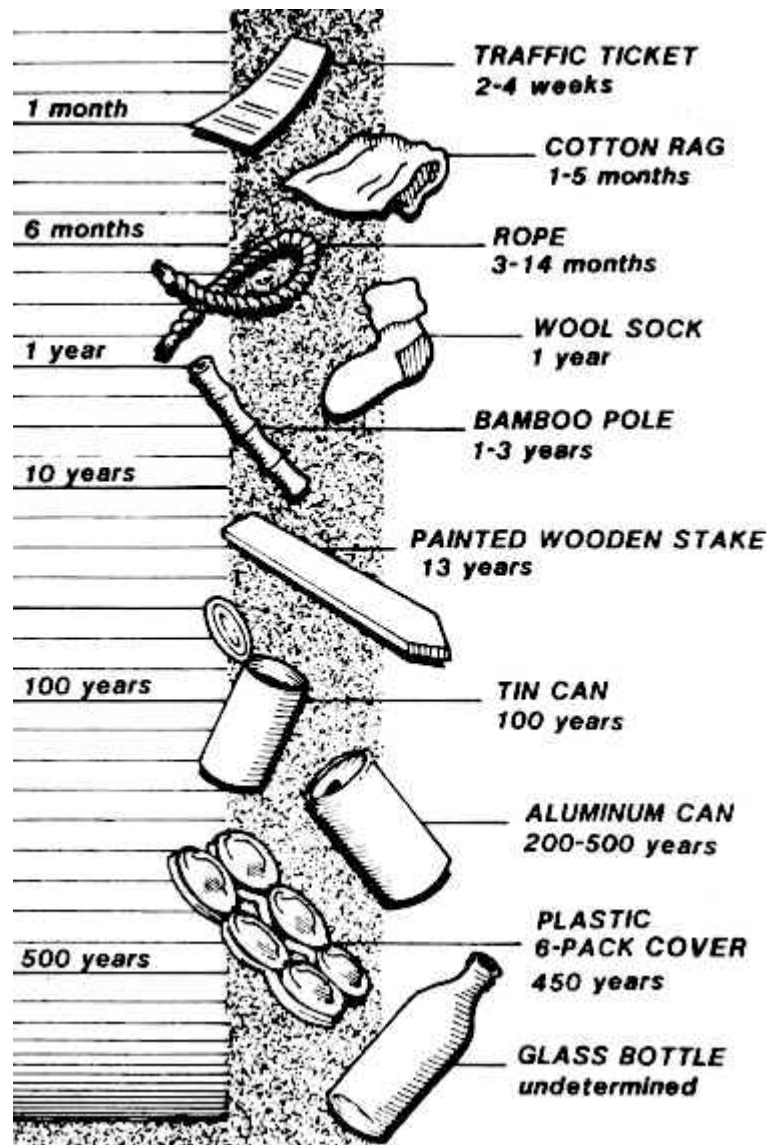
Shari Rowles (of the Committee) and I attended an employee meeting and gave a short talk on how the proceeds from the cans would be used to support the Skatepark.

The Department purchased two trash cans with built in crushers on the top which were placed in the two employee lounges.

So far, we have collected an average of two trash bags of compacted aluminum cans per week.

We greatly appreciate the employees of Wal-Mart recycling their beverage containers, not only helping the environment by recycling but supporting a community fund drive.

If you know of a business which might be interested in beginning a recycling program, please call me at 743-4808. Thank you! Chris



Enduring Ugliness: Amount of time it takes for different types of litter to decompose in the environment. From www.passaiccountynj.org.

BIG GEM UPDATE
What's in your showcase?

Hello everyone, can you feel spring in the air? Working down on the Big Gem has been a real treat lately as the buds are swelling and the birds are singing their wooing songs. I'm certain I heard peeper frogs singing too! Hope and promise are everywhere you look. Raking up piles of old branches and sticks reveal ferns just waking from their winter slumber. Remnants of last years bird nests can be seen through still vacant branches. And above the clutter of briar bushes and wild roses, stand stately and majestic Sycamores and Oaks. It's surprising sometimes how differently things look in the proper context.

In our own lives, we put our special possessions in special places. Above the mantel, amongst our bookshelves and in our curio cabinets, that is how many of us showcase our special treasures. The treasures of the Big Gem Park are being revealed day by day. Rock formations, beds of ferns, and lovely specimen trees can now be appreciated and enjoyed as showcase pieces within the Big Gem Park. Just as spring cleaning the garage or attic reveal forgotten treasures, so it is at the Big Gem; clearing away years of neglect and overgrowth, and finding the enduring, patient beauty.

Being involved with the Big Gem Park Project as I am, causes me to appreciate the comments of a sculptor I know, who once told me, "The art is already in the stone, one just has to take everything that is not the art, away". A beautiful, unique and special place lies within the Big Gem boundaries; we just need to take everything that is not, away. Even that which is not part of the park, should not be wasted or misused. If you need firewood, grapevine or honeysuckle for crafting or poles to grow your peas on, stop by and let me set you up. On the other hand, if you have native plants or well-behaved ornamentals to share, time to help build things like rustic benches or bird houses or would be willing to arrange a summer program for our youth, by all means do! You can showcase your special skills and talents at the Big Gem Park.
See you soon, Dane~

EARTH DAY CELEBRATION – FRIDAY APRIL 22, 2005

6:00 PM – 8:30 PM

Luray Elementary School

“Why Johnnie Can’t Breathe – Addressing Air Quality in Page County”

Interactive Discussion with:

Michael Towne – Virginia Chapter of the Sierra Club

Dudley F. Rochester, M.D. – Past president of the

Lung Association of Virginia

Jeffrey Seit, M.D. – Page Health Care

Ron Phillips – DEQ Air Quality Division

Dessert Bar! Earth Day Activities for Kids! Door Prizes!

For more information call 778 5378



Department of Environmental Services Update

Since the last newsletter we have been busy! The Department worked with the Skatepark Committee and held a can drive through which 17,000 aluminum cans were collected. Proceeds collected from recycling the aluminum went into the pot to help construct a skate facility on land donated by the Town of Stanley. The can drive ("Connect the Community") also was a registered event for America Recycles Day.

The Department officially became a member of the Chamber of Commerce and now is listed on their website to help visitors interested in the area know where to turn for their environmental questions and concerns.

At Christmas, the Department teamed up with the Big Gem organizers and the YEP Club – Youth for Environmental Protection, and the Water Quality Advisory Committee to pull a float in the Luray Christmas parade. We rode behind the Page Valley Transit Bus which chauffeured the Board of Supervisors.

Members of the Technical Advisory Committee (TAC) for the Transit Bus also went to Front Royal to help commemorate the launching of our neighbor's new bus system. Congressman Wolf was there to help celebrate this move to mass transit. It may be possible in the future to link the Page County and Front Royal services.

I attended an excellent conference in January on 'Green Infrastructure' sponsored by the Department of Forestry focusing on the importance of protecting natural resources. I then created a Power Point presentation and shared it with the Master Gardeners. Other presentations included a recycling talk to the Cub Scouts and a talk to the Luray Garden Club on rain gardens.

The Department assisted the Department of Environmental Quality in holding the second TMDL public meeting on the Mill Creek. DEQ and Gene Yagow of Virginia Tech discussed the findings from the studies conducted on the watershed and listened to public comments. They also encouraged feedback on the Mill Creek TMDL in writing until April 30, 2005.

The 'Watershed Dialogue' held at the Mimslyn went well and participants agreed that it is time to create a watershed management plan for the county. Page County has begun to gain recognition for its proactive approach to protecting water quality and quantity. The Dialogue was sponsored in full by the National Park Service, the Department of Conservation and Recreation and the Institute for Environmental Negotiation.

The Department of Environmental Services is working with the Natural Resources Conservation Service and the Page County Building Department on the Emergency Watershed Protection Program (EWP). There are 13 sites in the county and three sites along the Rockingham County border which sustained damage during Hurricane Isabel. Most of the sites need cobble bars and debris removed, banks stabilized and the stream rechanneled in order to decrease damage from future high-water events. The sites chosen are considered 'urgent and compelling'.

We have also received quite a few illegal dump/messy-neighbors complaints recently which we are investigating. Our general policy is to take photographs once a complaint is received, send a notification letter advising the individual of the county ordinances and guide them into compliance. Sometimes folks just have too many treasures stored in their front yards.

As always, the Department is here to serve the citizens of Page County. Give a call if we can be of assistance at 743-4808.

-- Chris

FREE CUTTINGS FOR STREAMBANK RESTORATION & PROTECTION

Red Osier Dogwood, Streamco Willow and Bankers Dwarf Willow

Call the Shenandoah Valley SWCD at 433-2853 ext. 3

Planting these cuttings along unvegetated stream banks helps to stabilize the bank, prevent erosion, promotes healthier terrestrial/aquatic habitats

FEATURED INVASIVE:

Brown Marmorated Stink Bug - Halyomorpha halys

As temperatures rise and the growing season begins, entomologists will be watching western Maryland for clues that a potentially devastating pest called the brown marmorated stink bug is emerging in the region.

The large brown bugs, native to China, Japan, Korea and Taiwan, have been expanding their range since first confirmed in the US in October 2001 in Allentown, Pa. They have since been identified in several other PA counties as well as parts of Delaware, Maryland, New Jersey, Virginia and West Virginia, mainly in communities along interstates 78 and 81. In January, the bug was detected in Portland, Ore., the first U.S. sighting west of the Mississippi River.

The Hagerstown cluster, confirmed 17 months ago, is of particular interest to Gary L. Bernon, an entomologist with the U.S. Dept. of Agriculture's Animal and Plant Health Inspection Service, who studied the insects in Allentown in 2003 and 2004. Bernon said the specimens that will soon stir from their wintertime rest inside many Hagerstown-area homes could reinforce his belief that the $\frac{3}{4}$ " marbled brown bugs pose a major threat to soybeans, orchard fruits and other crops.

"This is a major emerging pest," Bernon said. "It still has not come into contact with large-scale agricultural areas and that's when the stink will hit the fan, at least from the USDA point of view, because then we're going to find out what impact this is going to have on agriculture."

In the American South, another species, the green stink bug, damages soybeans each year, he said.

But Bernon, based in Cape Cod, Mass., said the green stink bug isn't as hardy as the brown marmorated stink bug; it can't survive northern winters like the brown bug, which seeks out warm hiding places in the fall.

The brown bug has been chilled in one respect: breeding. Bernon found that the Allentown bugs produced just one generation

during the season he studied them, whereas the same species in China reportedly has produced as many as five generations a year. As the bugs move south, Bernon fears they will become more prolific.

"It may be that in Hagerstown, it's able to have more than one generation a year. It could have moved far enough south to have not just one, but two generations. If that's true, I would say it's going to be double the trouble. It's going to be that much more likely that you're going to have agricultural problems and back-yard grower problems," he said.

The insects are dark brown, with white markings on their antennae that distinguish them from other stink bugs, and they sink when crushed.

The acrid smell is "horrendous", said Vicki Pillis, who reported an infestation at her house south of Hagerstown last fall after finding scores of them clinging to her sliding patio doors. "There could be 50 to 100 on either one of those doors," she said.

To keep stink bugs out, Bernon advises homeowners to tighten the seals on doorways and windows in the spring after the bugs depart in search of food.

(From the Associated Press and printed in the Daily News Record, Harrisonburg, VA 3/17/05)



Adult Female.



Fourth Instar